

Title (en)
Resonance power supply circuit

Title (de)
Resonanz-Stromversorgungsschaltung

Title (fr)
Circuit d'alimentation de puissance à résonance

Publication
EP 0920118 A3 20000719 (EN)

Application
EP 98122197 A 19981127

Priority
JP 32908097 A 19971128

Abstract (en)
[origin: EP0920118A2] A current resonance power supply circuit resonates the primary winding L61 of the switching transformer 64 and the current resonance capacitor C21 by turning on and off the switching elements 61 and 62 and obtains high frequency output from the secondary winding L62 of the switching transformer 64 according to such resonance. With a capacitor whose capacity increases as the operation frequency of the switching elements 61 and 62 decreases used as the capacitor C21 above, the out-of-resonance phenomenon hardly occurs upon a sharp drop of the AC power voltage or a quick increase of the load. <IMAGE>

IPC 1-7
H02M 3/337

IPC 8 full level
H01G 4/20 (2006.01); **H02M 3/28** (2006.01); **H02M 3/337** (2006.01); **H02M 7/48** (2007.01); **H02M 7/538** (2007.01)

CPC (source: EP KR US)
H02M 3/01 (2021.05 - EP KR US); **H02M 3/33571** (2021.05 - EP KR US); **H04N 5/63** (2013.01 - KR); **Y02B 70/10** (2013.01 - KR)

Citation (search report)
• [A] EP 0726640 A2 19960814 - TOSHIBA KK [JP]
• [A] EP 0778659 A2 19970611 - DELCO ELECTRONICS CORP [US]
• [A] US 4992919 A 19910212 - LEE CHU-QUON [US], et al
• [A] KOOSUKE HARADA, A. KATSUKI, M. FUJIWARA, H. NAKAJIMA, H. MATSUSHITA: "Resonant converter controlled by variable capacitance devices", IEE, vol. 8, no. 4, October 1993 (1993-10-01), pages 404 - 409, XP002138176

Cited by
WO2007020550A1

Designated contracting state (EPC)
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)
EP 0920118 A2 19990602; EP 0920118 A3 20000719; JP H11164554 A 19990618; KR 100287797 B1 20010416; KR 19990045555 A 19990625; US 6038141 A 20000314

DOCDB simple family (application)
EP 98122197 A 19981127; JP 32908097 A 19971128; KR 19980050664 A 19981125; US 20059698 A 19981127